

LISTING OF THE CLAIMS

This listing of claims will replace all prior versions, and listings, of claims in the application:

1. (Currently Amended) A substrate processing apparatus supplying a fluid to a rotated substrate for performing prescribed processing, comprising:

a substrate holding/rotating element holding and rotating said substrate; and

an atmosphere blocking member, corresponding in planar shape and size to said substrate, arranged oppositely and proximately to at least one surface of said substrate held by said substrate holding/rotating element and formed with a processing solution discharge port and a single inner gas discharge port discharging a processing solution and gas to said surface of said substrate respectively, wherein

said single inner gas discharge port is arranged eccentrically to a center of said surface of said substrate held by said substrate holding/rotating element, and

an outer gas discharge port is formed on said atmosphere blocking member outside said single inner gas discharge port so as to continuously and annularly enclose said single inner gas discharge port in plan view for discharging gas to said surface of said substrate held by said substrate holding/rotating element.

2. (Canceled)

3. (Currently Amended) The substrate processing apparatus according to claim [[21]] 1, wherein

said outer gas discharge port is so formed on said atmosphere blocking member that [[said]] an arrival position of said gas discharged from said outer gas discharge port is in the vicinity of said intermediate portion between the center and the outer peripheral edge of said surface of said substrate held by said substrate holding/rotating element.

4. (Currently Amended) The substrate processing apparatus according to claim 3, wherein

said outer gas discharge port starts discharging said gas in a delay from discharge of said gas from said single inner gas discharge port.

5. (Currently Amended) The substrate processing apparatus according to claim 4, wherein

the flow rate of said gas discharged from said outer gas discharge port is larger than the flow rate of said gas discharged from said single inner gas discharge port.

6. (Currently Amended) The substrate processing apparatus according to claim 5, wherein

said single inner gas discharge port and said outer gas discharge port are arranged inside a support cylinder supporting said atmosphere blocking member in plan view.

7. (Original) The substrate processing apparatus according to claim 1, wherein said outer gas discharge port is so formed on said atmosphere blocking member that an arrival position of said gas discharged from said outer gas discharge port is in the vicinity of the center of said surface of said substrate held by said substrate holding/rotating element.

8. (Currently Amended) The substrate processing apparatus according to claim 7, wherein

said single inner gas discharge port and said outer gas discharge port substantially simultaneously discharge said gas respectively.

9. (Currently Amended) The substrate processing apparatus according to claim 8, wherein

the flow rate of said gas discharged from said outer gas discharge port is larger than the flow rate of said gas discharged from said single inner gas discharge port.

10. (Currently Amended) The substrate processing apparatus according to claim 9, wherein

said single inner gas discharge port and said outer gas discharge port are arranged inside a support cylinder supporting said atmosphere blocking member in plan view.

11 - 18. (Canceled)

19. (Currently Amended) A substrate processing apparatus supplying a fluid to a rotated substrate for performing prescribed processing, comprising:

a substrate holding/rotating element holding and rotating said substrate;

an atmosphere blocking member, corresponding in planar shape and size to said substrate, arranged oppositely and proximately to at least one surface of said substrate held by said substrate holding/rotating element and formed with a processing solution discharge port and [[an]] a single inner gas discharge port discharging a processing solution and gas to said surface of said substrate respectively;

a support cylinder supporting said atmosphere blocking member to be rotatable; and

an inner shaft being inserted into a hollow portion of said support cylinder, wherein

said processing solution discharge port and said single inner gas discharge port are arranged on said inner shaft in plan view, said single inner gas discharge port being arranged eccentrically to a center of said surface of said substrate held by said substrate holding/rotating element, and

an outer gas discharge port discharging gas to said surface of said substrate held by said substrate holding/rotating element is formed on said atmosphere blocking member to be interposed between an outer peripheral surface of said inner shaft and an inner peripheral surface of said support cylinder in plan view so as to continuously and annularly enclose said single inner gas discharge port.

20. (Currently Amended) A substrate processing apparatus supplying a fluid to a rotated substrate for performing prescribed processing, comprising:

a substrate holding/rotating element holding and rotating said substrate; and

an atmosphere blocking member, corresponding in planar shape and size to said substrate, arranged oppositely and proximately to at least one surface of said substrate held by

said substrate holding/rotating element and formed with a processing solution discharge port and [[an]] a single inner gas discharge port discharging a processing solution and gas to said surface of said substrate respectively, wherein

said single inner gas discharge port is arranged eccentrically to a center of said surface of said substrate held by said substrate holding/rotating element, and

an outer gas discharge port is formed inclined on said atmosphere blocking member outside said single inner gas discharge port so as to continuously and annularly enclose said single inner gas discharge port in plan view for discharging gas downwardly and outwardly to said surface of said substrate held by said substrate holding/rotating element.

21. (Previously Presented) The substrate processing apparatus according to claim 1, wherein

said outer gas discharge port is so formed on said atmosphere blocking member that an arrival position of said gas discharged from said outer gas discharge port is closer to the center of said surface of said substrate held by said substrate holding/rotating element than an intermediate portion between the center and the outer peripheral edge of said surface.